PharmaSuite®

# PHASES OF THE EBR PACKAGE

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TECHNICAL MANUAL

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Rockwell Automation

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Chapter 1

# Introduction

This documentation contains important information how to configure and adapt phase building blocks of the EBR Phase Package including information about actions that need to be performed in FactoryTalk® ProductionCentre® and FT PharmaSuite.
The manual is an addition to the "Technical Manual Configuration and Extension" [A2]-[A6] (page 7).

The information is structured in the following sections:

#### CONFIGURATION AND EXTENSION

In this part you will find information for system engineers who implement customer-specific configurations and extensions.

- Configuration keys
  - **Upload image** phase (page 3)
  - **Upload PDF** phase (page 3)
  - **Produce material** phase (page 4)

Finally, the Reference Documents (page 7) section provides a list of all the documentation that is referenced in this manual.

## Intended Audience

This manual is intended for system engineers and phase developers who maintain phase building blocks of the EBR Phase Package.

They need to have a thorough working knowledge of FactoryTalk ProductionCentre, FT PharmaSuite, and FT PharmaSuite building blocks. Thus, we highly recommend to participate in a FactoryTalk ProductionCentre and FT PharmaSuite training before starting on the tasks described in this manual.
For more information on S88, EBR, and phase building blocks, see also "Technical Guide Developing System Building Blocks" [A7] (page 7).

## Naming Recommendations

When naming your artifacts (e.g. objects in Process Designer, classes, interfaces, methods, functions, building blocks) consider the following recommendation:

- Define and make use of a vendor code consisting of up to three uppercase letters as prefix (e.g. MYC for My Company).
- Prefix your artifacts with your vendor code, separated by _.
  **X_** and **RS_** are reserved for FT PharmaSuite.
- Observe the naming conventions defined in "Technical Guide Developing System Building Blocks" [A7] (page 7).

## Typographical Conventions

This documentation uses typographical conventions to enhance the readability of the information it presents. The following kinds of formatting indicate specific information:

**Bold typeface** — Designates user interface texts, such as

- window and dialog titles
- menu functions
- panel, tab, and button names
- box labels
- object properties and their values (e.g., status).

*Italic typeface* — Designates technical background information, such as

- path, folder, and file names
- methods
- classes.

CAPITALS — Designate keyboard-related information, such as

- key names
- keyboard shortcuts.

`Monospaced typeface` — Designates code examples.

Chapter 2

# Configuration and Extension

This chapter applies to the **Upload image**, **Upload PDF**, and **Produce material** phases. You will learn which phase-specific configuration keys and extension use cases are available.

For general information on configuration keys, see chapter "Managing Configurations" in Volume 4 of the "Technical Guide Configuration and Extension" [A5] (page 7).

**TIP**

Configuration keys are modified and defined in Process Designer.

## Configuration Keys Specific to the Upload Image Phase

This section describes the configuration keys specific to the phase.

**Phase/UploadImage/uploadMaximumFileSize**

- **Type**: Long
- **Value**: N/A
- **Description**: Defines the maximum allowed file size in bytes of the image file to be uploaded.
  Default: 1000000
- **Range**: <=1000000

## Configuration Keys Specific to the Upload PDF Phase

This section describes the configuration keys specific to the phase.

**Phase/UploadPdf/uploadMaximumFileSize**

- **Type**: Long
- **Value**: N/A
- **Description**: Defines the maximum allowed file size in bytes of the PDF file to be uploaded.
  Default: 5000000
- **Range**: <=5000000

## Configuration Keys Specific to the Produce Material Phase

This section describes the configuration keys specific to the phase.

**Phase/ProduceMaterial/BaseUnitOfMeasure**

- **Type**: String
- **Value**: ea
- **Description**: The countable unit of measure to be used for the calculation result in case packaging levels are defined.
  If the unit of measure of the defined output material is not equal to the configured unit of measure, a conversion factor between the configured unit of measure and the unit of measure of the defined output material must be available.
- **Evaluated**: When the **Produce material** phase is started in the Production Execution Client.
- **Range**: Valid countable unit of measure.

**Phase/ProduceMaterial/PhaseCompletesMatOutputClosedExcRisk**

- **Type**: BigDecimal
- **Value**: 30 (High Risk value)
- **Description**: The exception-specific risk level of a system-triggered exception added to a Produce Material phase when it is automatically closed due to the output material having been already closed.
- **Evaluated**: On startup
- **Range**: The values of the elements of the RiskClass choice list.

## Extension Use Case: Adding Further Packaging Levels for the Produce Material Phase

This section describes the procedure of adding a new packaging level to use with the **Produce material phase.**
In order to add a new packaging level **Trolley**, proceed as follows:

1. Configure the **PackagingLevel** choice list by adding a new **Trolley** entry, using **mes_ChoiceListManager** form.
2. Adjust the **MESChoiceListStrings** message pack and add a new entry for the new packaging level (**PackagingLevel-Trolley**) with the desired localized message.
3. Finally, adjust the message pack for the **Produce material phase** (*PhaseProductProduceMaterialXXXX*) and add a new set of entries for the new packaging level **Trolley,** named:
   - PackagingLevel_Trolley_S
   - PackagingLevel_Trolley_P
   - PackagingLevel_Trolley_SP

Where S and P stand for singular and plural, respectively. E.g. PackagingLevel_Trolley_S = trolley; PackagingLevel_Trolley_P = trolleys and PackagingLevel_Trolley_SP = Trolley(s).

# Chapter 3

# Reference Documents

The following documents are available from the Rockwell Automation Download Site.

| No. | Document Title | Part Number |
|---|---|---|
| A2 | FT PharmaSuite Technical Guide Configuration & Extension - Volume 1 | PSCEV1-GR011A-EN-E |
| A3 | FT PharmaSuite Technical Guide Configuration & Extension - Volume 2 | PSCEV2-GR011A-EN-E |
| A4 | FT PharmaSuite Technical Guide Configuration & Extension - Volume 3 | PSCEV3-GR011A-EN-E |
| A5 | FT PharmaSuite Technical Guide Configuration & Extension - Volume 4 | PSCEV4-GR011A-EN-E |
| A6 | FT PharmaSuite Technical Guide Configuration & Extension - Volume 5 | PSCEV5-GR008A-EN-E |
| A7 | FT PharmaSuite Technical Guide Developing System Building Blocks | PSBB-PM011A-EN-E |

**TIP**

To access the Rockwell Automation Download Site, you need to acquire a user account from Rockwell Automation Sales or Support.

# Appendix A

## Revision History

The following tables describe the history of this document.

Changes related to the document:

| Object | Description | Document |
|---|---|---|
| --- | --- | --- |

Changes related to "Introduction" (page 1):

| Object | Description | Document |
|---|---|---|
| --- | --- | --- |

Changes related to "Configuration and Extension" (page 3):

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